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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO
09/998,458	11/29/2001	Patrick Kusbel	UTL 00172	5670
75	590 08/26/2004		EXAMINER	
Kyocera Wireless Corp.			NGUYEN, SIMON	
Attn: Patent De P.O. Box 92828	•		ART UNIT	PAPER NUMBER
San Diego, CA	• -		2685	
			DATE MAILED: 08/26/2004	<i>6</i>

Please find below and/or attached an Office communication concerning this application or proceeding.

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	Application No.	Applicant(s)	$\overline{N}$			
	09/998,458	KUSBEL ET AL.	16.			
Office Action Summary	Examiner	Art Unit				
	SIMON D NGUYEN	2685				
The MAILING DATE of this communication app Period for Reply	pears on the cover sheet with	h the correspondence addre	9SS			
A SHORTENED STATUTORY PERIOD FOR REPL	Y IS SET TO EXPIRE 3 MC	NTH(S) FROM				
THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.1 after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a reply.  - If NO period for reply is specified above, the maximum statutory period of the period for reply within the set or extended period for reply will, by statute any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	36(a). In no event, however, may a rep y within the statutory minimum of thirty will apply and will expire SIX (6) MONT, a, cause the application to become ABA	oly be timely filed  (30) days will be considered timely.  HS from the mailing date of this comn  NDONED (35 U.S.C. § 133).	nunication.			
Status						
1) Responsive to communication(s) filed on 24 M	lay 2004.					
	action is non-final.					
) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is						
closed in accordance with the practice under E	Ex parte Quayle, 1935 C.D.	11, 453 O.G. 213.				
Disposition of Claims						
4) Claim(s) 1-20 is/are pending in the application	,					
4a) Of the above claim(s) is/are withdraw	wn from consideration.					
5) Claim(s) is/are allowed.						
6) Claim(s) <u>1-20</u> is/are rejected.						
7) Claim(s) is/are objected to.						
8) Claim(s) are subject to restriction and/o	or election requirement.					
Application Papers						
9)☐ The specification is objected to by the Examine						
10)☐ The drawing(s) filed on is/are: a)☐ acc						
Applicant may not request that any objection to the						
Replacement drawing sheet(s) including the correct		•	• •			
11) The oath or declaration is objected to by the Ex	carminer. Note the attached	Office Action of form PTO-	102.			
Priority under 35 U.S.C. § 119						
<ul> <li>12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of:</li> <li>1. Certified copies of the priority document</li> <li>2. Certified copies of the priority document</li> <li>3. Copies of the certified copies of the priority application from the International Bureau</li> </ul>	s have been received. s have been received in Ap rity documents have been r	plication No	age			
* See the attached detailed Office action for a list	, ,,,	eceived.				
Attachment(s)						
Notice of References Cited (PTO-892)	4) Interview Su					
<ol> <li>Notice of Draftsperson's Patent Drawing Review (PTO-948)</li> <li>Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)</li> </ol>		/Mail Date ormal Patent Application (PTO-15	52)			
Paper No(s)/Mail Date	6)  Other:		·=/			

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## **DETAILED ACTION**

## Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
- 2. Claims 1, 10 are rejected under 35 U.S.C. 102(b) as being anticipated by DeLuca et al. (4,879,758).

Regarding claim 1, DeLuca discloses a method for reducing the effects of spurious frequencies in a communication device (abstract, fig.2), comprising:

Providing a plurality of the frequency ranges (column 1 lines 28-29, column 14 line 19); selecting one of the passband frequency ranges (column 4 lines 3-40, column 12 lines 6-7); determining a clock frequency that minimizes spurious signals (column 6 lines 1-20, column 16 lines 3-5); adjusting a clock to generate a clock signal at the clock frequency; and driving a processor with the clock signal (column 14 lines 15-63, column 17 line 47 to column 18 line 19).

Regarding claim 10, this claim is rejected for the same reason as set forth in claim 1, wherein a logic device is the microprocessor having stored programs operating to reduce the spurious frequencies.

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3. Claims 7-9, 13-16, 19-20 are rejected under 35 U.S.C. 102(b) as being anticipated by Robin (5,745,848).

Regarding claim 7, Robin discloses a system for reducing the effects of spurious frequencies in a wireless communication device (abstract, figs.1,5), comprising: a microprocessor (column 8 line 24) having a reference frequency input; a clock (126) having an output (140) connected to the microprocessor input and an input (REF1) for selecting clock frequencies; a transceiver (110,120) for transceiving a plurality of selectable communication passbands (column 2 lines 38-59), wherein the clock frequency is selected to avoid harmonic frequencies (column 2 lines 1-14).

Regarding claims 13 and 19, these claims are rejected for the same reason as set forth in claim 7, wherein Robin further discloses a transceiver (110, 120) coupled to the microprocessor (114) for transceiving signals; and an antenna (108) (fig.1).

Regarding claims 8-9, 14-15, 20, Robin further discloses the microprocessor (500 of fig.5) comprises a programmable logic device (column 3 lines 29-46) and a gate array (inputs and outputs from the logic circuit 500 to other related components as shown in fig.5).

Regarding claim 16, Robin further discloses the transceiver comprises a receiver (110) (fig.1).

## Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

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(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

5. Claims 17, 18 rejected under 35 U.S.C. 103(a) as being unpatentable over Robin (5,745,848).

Regarding claim 17, Robin does not specifically disclose the transceiver is a multiple transceivers.

It should be noted that it is known to those skilled in the art the Robin's system can be used in a base station wherein the base station inherently has a plurality of transceivers in order to simultaneously transceiving from a plurality of mobile transceivers.

Regarding claim 18, Robin discloses the transceiver generating a center frequency on 936 MHz, a clock signal at 13 MHz at a 72th harmonic or a center frequency on 949 MHz with a 73<sup>rd</sup> harmonic of a clock signal at 13 MHz (column 4 lines 1-22, column 6 lines 37-65). However, Robin does not specifically disclose the transceiver generating a carrier frequency having a center frequency 900 MHz, a clock signal of 19.2 MHz with a 46<sup>th</sup> harmonic at 883.2 MHZ.

It should be noted that it is known to one skilled in the art at the time the invention was made to modify the Robin's transceiver with a carrier frequency having a center frequency 900 MHz, a clock signal of 19.2 MHz with a 46<sup>th</sup> harmonic at 883.2 MHZ to use in a wireless device with high frequencies in order to be used in a Bluetooth or microwave wireless devices.

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6. Claims 2-6, 11-12 are rejected under 35 U.S.C. 103(a) as being unpatentable over DeLuca et al. (4,879,758) in view of Robin (5,745,848).

Regarding claims 3, 5, DeLuca discloses a method for reducing spurious frequencies in a communication device (abstract, figs.2, 6-7, 11-12, 14), comprising: generating a clock signals at a clock frequency having a plurality of harmonic frequencies; generating a carrier signal at a carrier frequency; selecting (column 16 lines 4-5) and changing (column 18 lines 1-2) the clock frequency so that none of the harmonic frequencies is substantially equal to the carrier frequencies (column 12 line 8, column 13 line 62 to column 14 line 14, column 16 lines 1-5, column 17 line 47 to column 18 line 19, column 20 lines 3-29, figs.11-14). However, DeLuca does not specifically disclose the apparatus including a transmitter.

In the same field of invention, Robin discloses a controller (microprocessor) selectively adjusting a clock signal to control spurious signal interfering with the operating of transceiver's carrier frequencies (abstract, figs.1, 5, column 3 lines 29-46, column 6, column 8 lines 17-67). Therefore, it would have been obvious to one skilled in the art at the time the invention was made to have DeLuca, modified by Robin to implement in a wireless transceiver in order to improve the signal performance in the wireless transceiver.

Regarding claim 6, this claim is rejected for the same reason as set forth in claim 5, wherein DeLuca further discloses changing a carrier frequency to a second carrier frequency and changing the microprocessor clock frequency to a new clock frequency wherein the new clock frequency does not have any harmonic frequencies that are

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substantially equal to the second carrier frequency (column 17 line 47 to column 18 line 19, column 20 lines 3-47).

Regarding claim 2, DeLuca does not specifically disclose the communication device providing a cellular frequency range and a PCS frequency range.

Robin discloses the same field of invention in which the teaching for minimize spurious signal by adjusting the clock signal can be implemented in a cellular system (AMPS, ETACS, NMT) (column 9 lines 24-40). However, Robin does not specifically disclose the teaching can be implemented in a PCS. It is believed that a dual-band a cellular and PCS) can be implemented in the transceiver of Robin which is known to one skilled in the art in order to improve the signal performance in a dual-band mobile transceiver.

Regarding claim 4, in the DeLuca system, Robin further discloses the transceiver generating a center frequency on 936 MHz, a clock signal at 13 MHz at a 72th harmonic or a center frequency on 949 MHz with a 73<sup>rd</sup> harmonic of a clock signal at 13 MHz (column 4 lines 1-22, column 6 lines 37-65). However, Robin does not specifically disclose the transceiver generating a carrier frequency having a center frequency 900 MHz, a clock signal of 19.2 MHz with a 46<sup>th</sup> harmonic at 883.2 MHZ.

It should be noted that it is known to one skilled in the art at the time the invention was made to modify the Robin's transceiver with a carrier frequency having a center frequency 900 MHz, a clock signal of 19.2 MHz with a 46<sup>th</sup> harmonic at 883.2 MHZ to use in a wireless device with high frequencies in order to be used in a Bluetooth or microwave wireless devices.

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Regarding claims 11-12, these claims are rejected for the same reason as set forth in claims 8-9.

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Simon Nguyen whose telephone number is (703) 308-1116. The examiner can normally be reached on Monday-Friday from 7:00 AM to 4:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Edward F. Urban, can be reached on (703) 305-4385.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Group receptionist whose telephone number is (703) 306-0377.

Any response to this action should be mailed to:

Commissioner of Patents and Trademarks

Washington, D.C. 20231

Or faxed to:

(703) 872-9314, (for formal communications intended for entry)

Hand-delivered response should be brought to Crystal Park II, 2121 Crystal Drive, Arlington, VA, Sixth Floor (Receptionist).

Simon Nguyen

August 17, 2004